

KWM-001

PATENT APPLICATION

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

#3
1/19/02

In the U.S. Nationalization

Application of PCT/JP01/06143

Kazutaka SHIBATA

Attn: Application Branch

Application No. To Be Assigned

Filed: Concurrently herewith

For: SEMICONDUCTOR DEVICE AND METHOD FOR MANUFACTURING THE SAME

PRELIMINARY AMENDMENT

Commissioner of Patents
Washington, DC 20231

Sir:

Prior to the initial examination, please amend the above-identified application as follows:

IN THE CLAIMS:

Please amend claims 6-9, 12-20 and 24 as follows:

6. (Amended) The semiconductor device according to claim 1 or 2, wherein a second metal layer made of said second metal or said third metal layer is provided on a right surface and a side surface of said bump electrode made of said first metal, so that said first and second semiconductor chips are joined to each other via said alloy layer or via said third metal layer.

7. (Amended) The semiconductor device according to claim 1 or 2, said joining portion where said first and second semiconductor chips are joined to each other has such a fillet formed thereon that is made of an alloy layer of said first metal and said second metal or said third metal layer.

8. (Amended) The semiconductor device according to claim 1, wherein said first metal is Au and said second metal is Sn, so that said joining portion has an Au-Sn alloy.

9. (Amended) The semiconductor device according to claim 2, wherein said third metal is made of an Au-Sn alloy.